CLAIMS

1. Device for fixing a printing sleeve (3), particularly a printing form or a blanket cylinder on a cylindrical drive shaft (1) in which a deformable cover (2) is disposed between the sleeve (3) and the shaft (1), the surface of the shaft (1) having a series of cavities (7) hollowed out therein, separated by bearing surfaces (12) on which the cover (2) is in abutment, the device comprising means adapted to ensure radial deformation of the deformable areas of the cover (2) under the effect of an over-pressure on the external face of the latter or an under-pressure on its internal face, characterized in that the shaft (1) and the sleeve (3) are provided with angular indexing means (25).

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- 2. Device according to Claim 1, characterized in that the means adapted to ensure radial deformation of the deformable areas of the cover (2) are constituted by a controlled supply (13) of pressurized air of the separating surface existing between the sleeve (3) and the cover (2).
- 15 3. Device according to one of Claims 1 or 2, characterized in that the angular indexing means are constituted by a finger (25) disposed on one of the two pieces (1, 3) to be indexed, namely the shaft (1) or the sleeve (3), and adapted to be positioned in a housing (31), of complementary shape, provided in the other piece (3, 1).

- 4. Device according to Claim 3, characterized in that the finger (25) is mounted to move elastically in a cavity under the action of a spring (29).
- 5. Device according to one of the preceding Claims, characterized in that the sleeve (3) is covered by a removable thin tube (37) indexed with respect thereto.
- 5 6. Device according to Claim 5, characterized in that the separation surface between the internal surface of the tube (37) and the external surface of the sleeve (3) is in communication with means for controlled supply of pressurized air.
 - 7. Device according to Claim 6, characterized in that said separation surface is connected by at least one conduit (14, 15) with the controlled supply (13) of pressurized air of the separating surface existing between the sleeve (3) and the cover (2).

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- 8. Device according to Claim 7, characterized in that the conduit (14), connecting the controlled supply (13) of pressurized air of the separation surface existing between the sleeve (3) and the shaft (1), comprises at its downstream end a closure valve (16) preventing the emergence of air when the sleeve (3) is not coated with a tube (37).
- 9. Device according to Claim 7, characterized in that the downstream end of each conduit (15) for controlled supply of pressurized air of the separating surface existing between the sleeve (3) and the cover (2), is provided with a control valve (41) making it possible to send the flow of pressurized air either towards this

latter separation surface, when it is desired to remove the sleeve (3), or towards the separation surface of the sleeve (3) and the tube (37) when it is desired to remove the latter.

- 10. Device according to Claim 9, characterized in that the control valve (41) is of the rotating type and the angular indexing means are constituted by a finger fast with this valve (41) so that this finger is in mesh with the sleeve (3) when the valve (41) is positioned to send the flow of pressurized air in the direction of the tube (37).
- 11. Device according to one of Claims 9 or 10, characterized in that the valve (41) comprises a finger adapted, in a given position, to block the axial displacement of the sleeve (3).